UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 5
77 WEST JACKSON BOULEVARD
CHICAGO, IL 60604-3590

MAY 2 2 2015

REPLY TO THE ATTENTION OF:

CERTIFIED MAIL 7009 1680 0000 7663 6162
RETURN RECEIPT REQUESTED

Mr. Todd Meyer
President/General Manager
Enviro-Chem, Inc.
21821 Industrial Boulevard
Rogers, Minnesota 55374

Re: Notice of Violation
Compliance Evaluation Inspection
MND 980 996 805

Dear Mr. Meyer:

On July 29, 2014 a representative of the U.S. Environmental Protection Agency inspected the Enviro-Chem, Inc. (Enviro-Chem) facility located in Rogers, Minnesota. As a "large quantity generator" of hazardous waste, Enviro-Chem is subject to the Resource Conservation and Recovery Act, 42 U.S.C. § 6901 et seq. (RCRA). The purpose of the inspection was to evaluate Enviro-Chem's compliance with certain provisions of RCRA and its implementing regulations related to the generation, treatment and storage of hazardous waste. A copy of the inspection report is enclosed for your reference.

Based on information provided by Enviro-Chem, EPA's review of records pertaining to Enviro-Chem, and the inspector's observations, EPA has determined that Enviro-Chem has unlawfully stored hazardous waste without a permit or interim status as a result of Enviro-Chem's failure to comply with certain conditions for a permit exemption under Minn. R. Part 7045.0292 Subparts 1, 2 and 8 [40 C.F.R. § 262.34(a)-(c)]. EPA has identified the permit exemption conditions with which Enviro-Chem was out of compliance at the time of the inspection in paragraphs 1-3, below.

Many of the conditions for a RCRA permit exemption are also independent requirements that apply to permitted and interim status hazardous waste management facilities that treat, store, or dispose of hazardous waste (TSD requirements). When a hazardous waste generator loses its permit exemption due to a failure to comply with an exemption condition incorporated from Minn. R. Part 7045.0292 the generator: (a) becomes an operator of a hazardous waste storage facility; and (b) simultaneously violates the corresponding TSD requirement. The exemption conditions identified in paragraphs 2 and 3 are also independent TSD requirements incorporated

from Minn. R. Parts 7045.0552 to 7045.0649. Accordingly, each failure of Enviro-Chem to comply with these conditions is also a violation of the corresponding requirement in Minn. R. Parts 7045.0552 to 7045.0649 [40 C.F.R. Part 265] (if the facility should have fully complied with the requirements for interim status), or Minn. R. Parts 7045.0450 to 7045.0551 [40 C.F.R. Part 264] (if the facility should have been permitted).

Finally, EPA has determined that Enviro-Chem violated RCRA requirements related to a hazardous waste determination and an exclusion, as described in paragraphs 4 and 5, below.

STORAGE OF HAZARDOUS WASTE WITHOUT A PERMIT OR INTERIM STATUS

At the time of the inspection, Enviro-Chem was out of compliance with the following large quantity generator permit exemption conditions:

1. Satellite Accumulation

Under Minn. R. Part 7045.0292 Subp. 8(A) [40 C.F.R. § 262.34(c)], a large quantity generator may accumulate as much as 55 gallons of hazardous waste or one quart of acute hazardous waste listed per waste stream per each point of generation.

At the time of the inspection, Enviro-Chem was storing more than 55 gallons of the hazardous waste acid in a cubic yard tote at a point of generation.

The permit exemption conditions identified below in paragraphs 2 and 3 are also independent TSD requirements violated by Enviro-Chem:

2. Written Hazardous Waste Tank Assessment

Under Minn. R. Part 7045.0292 Subp. 1(B)(2) and 7045.0628 Subp. 3(A) [40 C.F.R. §§ 262.34(a)(1)(ii) and 265.192(a)], a large quantity generator that owns or operates a new hazardous waste tank system must obtain a written assessment, reviewed and certified by an independent registered professional engineer, attesting that the system has sufficient structural integrity and is acceptable for storing hazardous waste.

At the time of the inspection, Enviro-Chem did not have a written hazardous waste tank assessment for its hazardous waste tanks.

3. Design and Operation of Facility

Under Minn. R. Part 7045.0292 Subp. 1(G) and 7045.0556 Subp. 2 [40 C.F.R. § 262.34(d)(4); 40 C.F.R. § 265.31], a large quantity generator's facility must be designed, constructed, maintained, and operated to minimize the possibility of a fire, explosion, or any unplanned sudden or non-sudden release to air, land, or water of hazardous waste or hazardous waste constituents which could threaten human health or the environment.

At the time of the inspection, Enviro-Chem was storing various equipment, buckets and debris within the secondary containment of the hazardous waste acid storage tank.

Summary: By failing to comply with the conditions for a permit exemption, above, Enviro-Chem became an operator of a hazardous waste storage facility, and was required to obtain a Minnesota hazardous waste storage permit. Enviro-Chem failed to apply for such a permit. Enviro-Chem's failure to apply for and obtain a hazardous waste storage permit violated the requirements of Minn. R. part 7001.0520, subparts 1.A and 2.A [40 C.F.R. § 270.1(c) and 270.10(a) and (d)]. Any failure to comply with a permit exemption condition incorporated from Minn. R. Parts 7045.0552 to 7045.0649 is also an independent violation of the corresponding TSD requirement.

OTHER VIOLATIONS

4. Hazardous Waste Determination

Under Minn. R. Part 7045.0214 Subp. 1 [40 C.F.R. § 262.11], a generator must determine whether its waste is hazardous.

At the time of the inspection, Enviro-Chem had not made a determination whether the thick slurry waste, located underneath the evaporator that was still in-use, was hazardous.

5. Storage

Under Min. R. Part 7045.0120 Subp. 1(L) [40 C.F.R. § 262.11], a hazardous waste that is generated in a product or raw material storage tank, a product or raw material transport vessel, a product or raw material pipeline, or in a manufacturing process unit or an associated non-waste-treatment-manufacturing unit, is not subject to regulation under 40 C.F.R. Parts 262, 268, 270, 271, and 124 or the notification requirements of Section 3010 of RCRA until it exits the unit in which it was generated, unless the unit is a surface impoundment, or unless the hazardous waste remains in the unit more than 90 days after the unit ceases to be operated for manufacturing, or for storage or transportation of product or raw materials.

At the time of the inspection, Enviro-Chem was storing waste in a filter press that was no longer being used and had not been used in more than ninety (90) days.

At this time, EPA is not requiring Enviro-Chem to apply for a Minnesota hazardous waste storage permit so long as it immediately establishes compliance with the conditions for a permit exemption outlined in paragraphs 1, 2 and 3, above.

According to Section 3008(a) of RCRA, EPA may issue an order assessing a civil penalty for any past or current violation, requiring compliance immediately or within a specified time period, or both. Although this letter is not such an order or a request for information under

Section 3007 of RCRA, 42 U.S.C. § 6927, we request that you submit a response in writing to us no later than thirty (30) days after receipt of this letter documenting the actions, if any, which you have taken since the inspection to establish compliance with the above conditions and other violations. You should submit your response to Ms. Jamie Paulin, U.S. EPA, Region 5, 77 West Jackson Boulevard, LR-8J, Chicago, Illinois 60604.

If you have any questions regarding this letter, please contact Ms. Paulin, of my staff, 312-886-1771 or at Paulin.jamie@epa.gov.

Sincerely,

Gary J. Victorine, Chief
RCRA Branch

Enclosure

cc: John Elling, Minnesota Pollution Control Agency, (john.elling@state.mn.us)

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 5
77 W. JACKSON BOULEVARD
CHICAGO, IL 60604

COMPLIANCE EVALUATION INSPECTION REPORT

SITE NAME: Enviro-Chem, Inc.

EPA ID No.: MND980996805

LOCATION ADDRESS: 21821 Industrial Boulevard
Rogers, Minnesota 55374

NAICS CODE(S): 56292 [Materials Recovery Facilities]

DATE OF INSPECTION: July 29, 2014

EPA INSPECTOR:
Jamie L. Paulin
Chemist
LR-8J
Compliance Section 1
(312) 886-1771 Direct
(312) 353-4788 Facsimile
paulin.jamie@epa.gov

PREPARED BY:
Jamie L. Paulin
Chemist
3/2/15
Date

APPROVED BY:
Michael Cunningham, Chief
Compliance Section 1
RCRA Branch
3/24/15
Date

INTRODUCTION:

The purpose of the inspection was to conduct an un-announced Compliance Evaluation Inspection (CEI) at the Enviro-Chem, Inc. (Enviro-Chem) facility, located at 21821 Industrial Boulevard, Rogers, Minnesota to examine Enviro-Chem's management of its Resource Conservation and Recovery Act (RCRA) regulated waste, and to determine Enviro-Chem's compliance with RCRA, including used oil regulations.

Enviro-Chem notified as a large quantity generator (LQG) on or about December 7, 1984, and has remained in LQG status. They are a precious metal recycling facility using chemical, thermal, and mechanical processing. Eviro-Chem has two locations: 1) the recycling facility and 2) the collecting, processing and shredding facility, located at 20005 County Road 81 (MNR000007633).

They operate one shift per day, five days per week. They do have a Minnesota Pollution Control Agency license as an LQG and the license was displayed.

OPENING CONFERENCE:

Ms. Marie Oleus, Hennepin County Environmental Services, Hennepin County Department of Environmental Services, and I entered the Enviro-Chem facility at 9:49am on July 29, 2014. I presented my credentials to Mr. Todd Meyer, President and General Manager, and described the purpose of my visit. Mr. Meyer did not make a CBI claim on the information gathered during the inspection or on the photos taken, documents copied and/or verbal information provided. I also provided a Small Business Resources Information Sheet to Mr. Meyer.

During the opening conference, we discussed the various processes that Enviro-Chem operates. Mr. Meyer explained that Enviro-Chem is a precious metal processor and recycler. He explained the process and the materials that they receive.

- Circuit Boards – circuit boards are dismantled at the 20005 County Road 81 facility and shredded.
- Jewelry, ingots, wire, film, platinum, photo cells, silver oxide batteries are received at the facility.
- Cyanide solutions are received at the facility.
- Acid solutions containing gold and platinum are received at the facility.

Some of the materials are melted in the incinerators to create bars. The bars are then tested for percentage of metals. Some of the materials are neutralized in a filter system, which collects precious metals. The filter collects 97-98% precious metals that can be sold for re-use. The liquid is then stored as hazardous waste and then evaporated. That material is then run through a filter press. The sludge is then disposed of as hazardous waste.

Enviro-Chem has a baghouse which collects the ash from the incinerators. They send the ash to Mexico for metals recovery. Mr. Meyer explained that the only hazardous waste stream being generated was the waste sulfuric acid from the metals neutralization process and the filter press sludge.

Mr. Meyer also stated that Enviro-Chem has a Title 5 Incineration Permit under air although the EPA database ECHO did not reflect this.

After our opening conference, we began the physical site inspection.

SITE INSPECTION:

Mr. Todd Perron, Operations Manager, escorted Ms. Oleus and me on the physical site inspection, which began in the laboratory. Cyanide that is collected was being stored in a container in the laboratory in a satellite accumulation area (SAA). In addition to cyanide, waste acid was also being stored in the SAA in the laboratory. *See*, photographs 1, 2 and 3.

From there, we proceeded to the main processing area. Mr. Perron explained that within this area, metal bars were being melted in the furnaces for precious metals recovery. Enviro-Chem has several furnaces and five incinerators located in the furnace room. Residual ash that is collected from the furnaces is sent off-site to be refined in Mexico. *See*, photographs 4 through 9.

Mr. Perron then escorted us to the main processing area. Raw materials were being stored on shelves, located in this area. Material that was waiting to be processed/incinerated was also being stored on shelves in 55-gallon containers. Open cardboard boxes of shredded plastic were being stored in this area as well. *See*, photographs 10, 11 and 12.

We then went outside the building to see the baghouse dust collection area. Baghouse dust was being collected in 55-gallon containers. When the containers are full, the dust is sent to Mexico for silver recovery. *See*, photograph 13.

After we inspected the baghouse dust collection area, we went back inside of the building. After the evaporation process, the sludge is collected in boxes. Enviro-Chem was storing one open rectangle shaped box with drying sludge inside within the other containers of various materials. *See*, photograph 14.

Enviro-Chem receives hazardous waste for precious metal recovery. They have a hazardous waste storage area for containers that are received. The wastes consisted of cyanide and silver waste. *See*, photograph 15.

Near the hazardous waste storage area, scrap circuit boards that have been received to be processed for precious metal recovery were being stored in open cardboard boxes. *See*, photograph 16.

Enviro-Chem also received dental amalgams, which were being stored in red-bag containers. Mr. Perron explained that the amalgams are just stored at Enviro-Chem prior to being shipped to Recycle Technologies for processing. Near the storage of the amalgams, they were also storing several smaller containers of various materials waiting to be processed. *See*, photographs 17 and 18.

Enviro-Chem also generates its own acid waste from the precious metals recovery process and it is stored in the Acid hazardous waste storage area in 55-gallon containers. Near this area, raw materials and equipment were also being stored on the floor. *See*, photographs 19 and 20.

Mr. Perron showed us the precious metal recovery process. Two tanks were located in the area. One was labeled as hazardous waste. The hazardous waste tank was positioned on a stack of wooden planks. Mr. Perron explained the process to us as: 1) precipitation; 2) decanting off the liquid; 3) filter the liquid into the hazardous waste tank; 4) drain the liquid from the hazardous waste tank to the lower tank for neutralization; and, 5) drain the neutralized material into totes. The process was located in secondary containment; however there were several items, raw materials and equipment also being stored within this containment area. The floor appeared to be stained. *See*, photographs 21 and 22.

Once the acid material being stored in the tank, labeled as hazardous waste, can no longer be used in the process, Enviro-Chem empties the material into a tote that was being stored near the process area. The tote was labeled as a hazardous waste and it did have a start date of accumulation; however Mr. Perron was considering the tote to be an SAA container. I explained that if the hazardous waste level would go above 55 gallons, then they would need to put the container into their hazardous waste storage area within three days or consider this location to be a hazardous waste storage area. At the time of the inspection, it was difficult to decipher how many gallons were contained in the tote. *See*, photographs 23 and 24.

The neutralized liquid is then placed into an evaporator which is used to reduce the liquid. From the evaporator, the material is placed inside a filter press to create a sludge that is put into pans with slag and sent to smelting for further metal recovery. The evaporator had a thick slurry located underneath it within the secondary containment. *See*, photographs 25, 26, and 32.

Mr. Perron stated that one of the filter presses was no longer being used and has not been used in ten years. The press still had filter cake and material located inside an open box that was part of the press, which had been stored there for ten years. *See*, photographs 27 and 28.

Two tanks were located near the evaporator. One was labeled as hazardous waste. The volume of the tank is 3000 gallons and it did have secondary containment. The tank also had a log taped to it, showing the dates of accumulation and the volume of the hazardous waste. This hazardous waste tank was storing the cyanide treatment process hazardous waste prior to evaporation. The cyanide treatment process is described below. Another identical tank was being stored within the secondary containment; however Mr. Perron stated that they are no longer using the second tank. See, photographs 25, 26, and 29.

Near the evaporators, Enviro-Chem was also storing hazardous waste in a tote that had been received from off-site. The hazardous waste was being stored prior to precious metal recovery. *See*, photographs 30 and 31.

Enviro-Chem also operates a cyanide treatment process. The treated liquid is then placed into storage prior to going to the evaporator. Each treatment tank has a volume of 1000 gallons, sitting on a raised platform, and is located in secondary containment with a poly vinyl chloride liner. Mr. Perron stated that the cyanide treatment process begins with raising the pH; then aluminum powder is used to drop out all of the cyanide. Two hazardous waste tanks were located near the cyanide treatment process. *See*, photograph 33.

A shelving unit was positioned in the middle of the cyanide treatment process and precious metal recovery process room. Various material that was awaiting processing was being stored on the shelves in 55-gallon containers. Various boxes and pallets were located in front of the shelving unit. I asked Mr. Perron how often they move the 55-gallon containers because it appeared that they could not get a fork lift to the shelving unit. He explained that they move the boxes when they need to remove the 55-gallon containers from the shelves for processing, and this occurs every 30 to 40 days. *See*, photograph 34.

This area was the last area to be inspected at this location. Once the site inspection was completed, I completed the records review inspection at a conference table.

RECORDS REVIEW:

Mr. Perron and Ms. Oleus aided me in the review of the hazardous waste records after completing the physical site inspection.

1. Personnel Training

Enviro-Chem did have a RCRA training program in place, which included documentation of training. High Point Environmental Health and Safety performed the training. Training was conducted within six months of the employees hiring. The training was conducted on 3/31/14, 3/18/13 and 4/30/12.

2. Manifests

I reviewed the manifests for shipments of hazardous waste that were received by Enviro-Chem for the years 2014, 2013 and 2012. There were no issues with the manifests I reviewed that were being received.

I also reviewed the manifests of hazardous waste that were accompanying shipments that were being sent off-site for disposal. Shredded circuit boards were being shipped on packing invoices to various companies like UMicore and Hanwa and Mitsubishi. The D002, D007

and D011 hazardous wastes were being shipped to Evoque Water Technologies, formerly Siemens, for disposal. There were no issues with the manifests I reviewed for shipments for off-site disposal.

3. Waste Analysis and Recordkeeping

I observed that Enviro-Chem did have, as a record on-site, a land disposal restriction (LDR) notification form for shipments of hazardous waste.

4. Contingency Plan

A Contingency Plan was available for my review during the inspection and contained all of the elements required in Minn. R. 7045.0450 [40 CFR § 265.52].

5. Preparedness and Prevention

Agreements with local emergency authorities, contractors, or local hospitals were available for my review during the inspection.

6. Annual Reporting

Enviro-Chem is currently an LQG and did file biennial reports for the years 2013 and 2011.

7. Weekly and Daily Inspections

At the time of the inspection, Enviro-Chem was conducting weekly inspections of the hazardous waste storage area and daily inspections of the hazardous waste storage tanks.

8. Tank Assessments

At the time of the inspection, Enviro-Chem did not have a copy of the written tank assessments of the hazardous waste storage tanks. Ms. Oleus gave me a copy at the time of the inspection; however Enviro-Chem did not have a copy on-site. Pinnacle Engineering performed the tank inspections on all three hazardous waste storage tanks.

SITE INSPECTION – 20005 County Road 81 – Non Ferrous Metal Item Storage

At 2:22pm, Mr. Brian Meyer, Operations Manager, escorted Ms. Oleus and me on the physical site inspection at the 20005 County Road 81 site. Mr. Meyer explained that all non-ferrous metal items awaiting precious metal processing at the main facility are stored at this site. *See*, photograph 37.

A shredder was located at the non-ferrous storage facility inside one of the buildings. The material is processed through the shredder prior to being shipped for processing at the main facility. *See*, photographs 38, 39, and 40.

Metal items were being stored inside the building in various containers prior to shredding. *See*, photographs 41, 42, and 43.

A trailer was attached to the building. The trailer was also storing metal items that are awaiting shredding prior to precious metal recovery. *See*, photograph 44.

Outside of the building, more metal items were being stored in various containers on the pavement. See, photographs 47, 48 and 49.

This area was the last area to be inspected at this location. Once the site inspection was completed, I left the premises.

CLOSING CONFERENCE:

I conducted the closing conference with Mr. Perron prior to inspecting the non-ferrous metal storage facility.

I explained to him that I would need to review my notes and photographs before making any compliance decisions. I also explained that Enviro-Chem would get a copy of my inspection report along with the photo log.

I did state that Enviro-Chem needed to have a copy of the tank assessments on-site.

Ms. Oleus and I departed Enviro-Chem around 3:10pm.

ATTACHMENT: (2)

Attachment 1	Photographs taken during the time of the inspection.
Attachment 2	Inspection Checklist.

ENCLOSURE: (1)

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 1
Photo Filename DSCN0673.JPG
Date/Time 7/29/2014 10:29:00 AM
Photographer Jamie Paulin

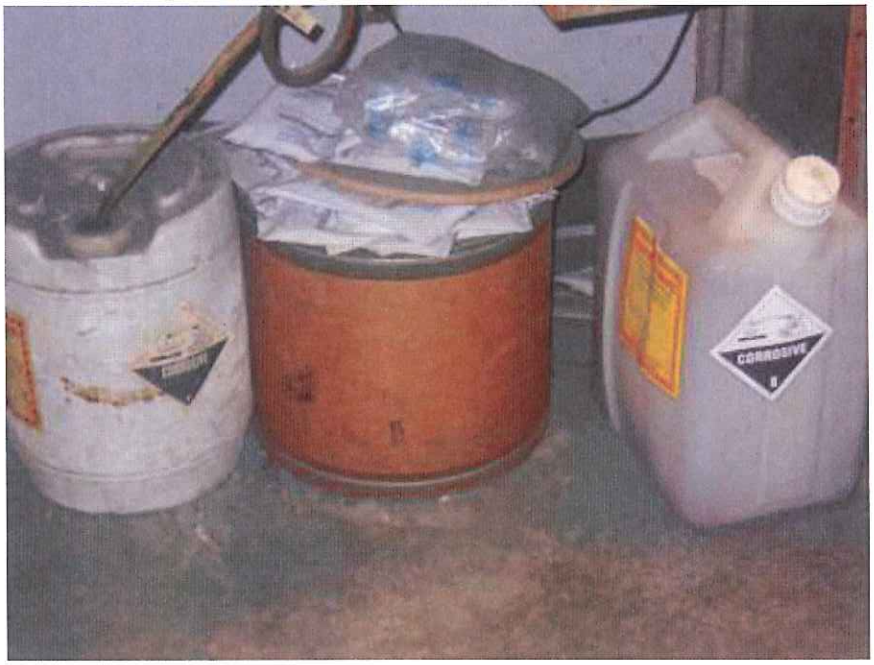
Description

Laboratory. The cyanide is collected in this container in the laboratory and stored in a satellite accumulation area (SAA).

Disk Number 1
Photo Number 2
Photo Filename DSCN0674.JPG
Date/Time 7/29/2014 10:40:00 AM
Photographer Jamie Paulin

Description

Laboratory. Waste acid was being collected after use and was stored in an SAA, located in the laboratory.



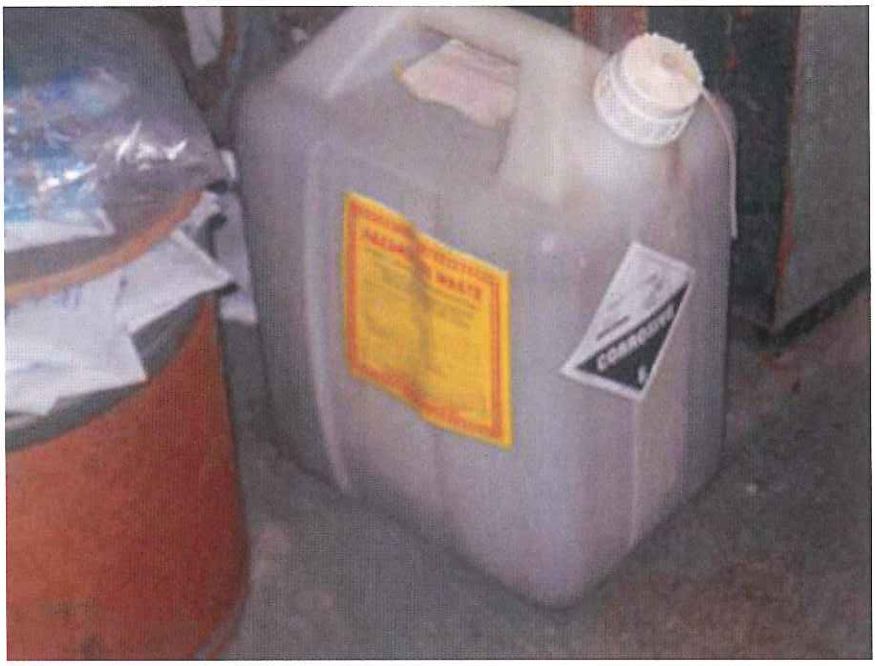
Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 3
Photo Filename DSCN0675.JPG
Date/Time 7/29/2014 10:41:00 AM
Photographer Jamie Paulin

Description

Laboratory. Waste acid was being collected after use and was stored in an SAA, located in the laboratory.



Disk Number 1
Photo Number 4
Photo Filename DSCN0676.JPG
Date/Time 7/29/2014 10:43:00 AM
Photographer Jamie Paulin

Description

Main processing area. Metal bars were being melted in the furnace for precious metals recovery.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 5
Photo Filename DSCN0677.JPG
Date/Time 7/29/2014
10:43:00 AM
Photographer Jamie Paulin

Description

Main processing area. Metal bars were being melted in the furnace for precious metals recovery.

Disk Number 1
Photo Number 6
Photo Filename DSCN0678.JPG
Date/Time 7/29/2014
10:45:00 AM
Photographer Jamie Paulin

Description

Main processing area. One of the melting furnaces that is used for melting the metal was located here.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 7
Photo Filename DSCN0679.JPG
Date/Time 7/29/2014 10:46:00 AM
Photographer Jamie Paulin

Description

Incinerator located in the main processing area.

Disk Number 1
Photo Number 8
Photo Filename DSCN0680.JPG
Date/Time 7/29/2014 10:48:00 AM
Photographer Jamie Paulin

Description

Residual ash that is collected from the furnaces is sent off-site to be refined.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 9
Photo Filename DSCN0681.JPG
Date/Time 7/29/2014
10:51:00 AM
Photographer Jamie Paulin

Description

Row of incinerators, incinerator piping and after burners were located in the main processing area.

Disk Number 1
Photo Number 10
Photo Filename DSCN0682.JPG
Date/Time 7/29/2014
10:55:00 AM
Photographer Jamie Paulin

Description

Raw materials were being stored on shelves located in the main processing area.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 11
Photo Filename DSCN0683.JPG
Date/Time 7/29/2014 10:55:00 AM
Photographer Jamie Paulin

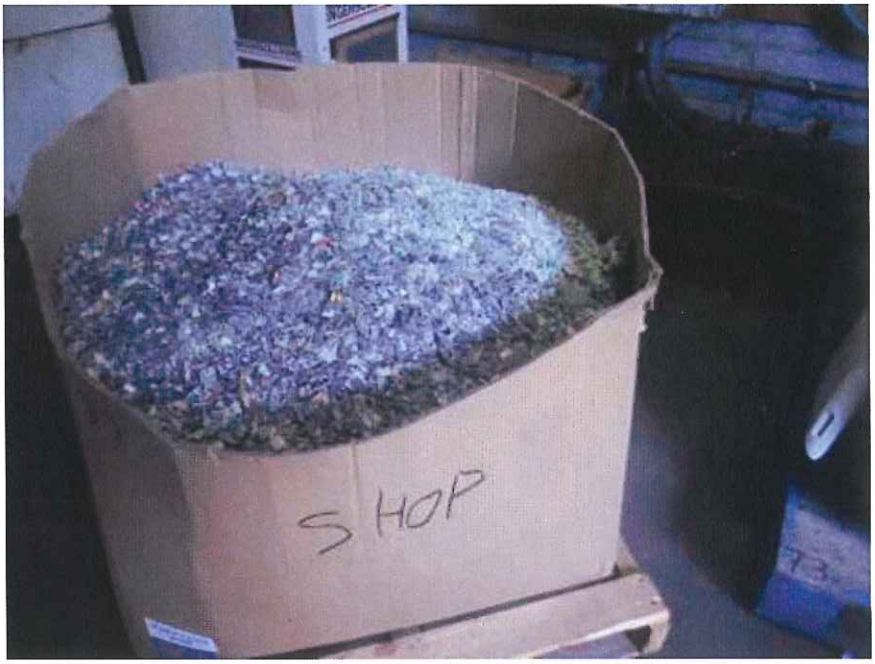
Description

Shelving unit, main processing area. The 55-gallon containers were storing material that was waiting to be processed.

Disk Number 1
Photo Number 12
Photo Filename DSCN0684.JPG
Date/Time 7/29/2014 10:58:00 AM
Photographer Jamie Paulin

Description

Sample of plastic after shredding.



Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 13
Photo Filename DSCN0685.JPG
Date/Time 7/29/2014 10:58:00 AM
Photographer Jamie Paulin

Description

Baghouse dust was being collected in 55-gallon containers. When the containers are full, the dust is sent to Mexico for silver recovery.

Disk Number 1
Photo Number 14
Photo Filename DSCN0686.JPG
Date/Time 7/29/2014 11:01:00 AM
Photographer Jamie Paulin

Description

Sludge was being collected after evaporation.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 15
Photo Filename DSCN0687.JPG
Date/Time 7/29/2014 11:04:00 AM
Photographer Jamie Paulin

Description

Hazardous waste storage. In-coming hazardous waste was being stored here, such as cyanide waste and silver waste.

Disk Number 1
Photo Number 16
Photo Filename DSCN0688.JPG
Date/Time 7/29/2014 11:06:00 AM
Photographer Jamie Paulin

Description

Storage of scrap circuit boards that have been received to be processed for precious metal recovery.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 17
Photo Filename DSCN0689.JPG
Date/Time 7/29/2014 11:08:00 AM
Photographer Jamie Paulin

Description

Dental amalgams were being stored prior to being shipped to Recycle Technologies for processing.

Disk Number 1
Photo Number 18
Photo Filename DSCN0690.JPG
Date/Time 7/29/2014 11:11:00 AM
Photographer Jamie Paulin

Description

Storage of material waiting to be processed.

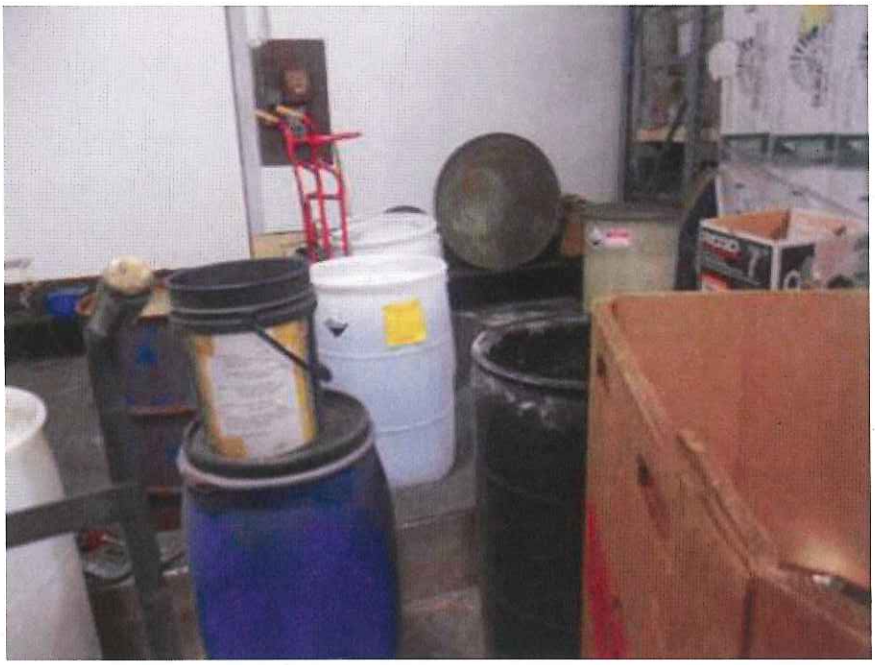
Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 19
Photo Filename DSCN0691.JPG
Date/Time 7/29/2014 11:16:00 AM
Photographer Jamie Paulin

Description

Storage of acid hazardous waste.



Disk Number 1
Photo Number 20
Photo Filename DSCN0692.JPG
Date/Time 7/29/2014 11:16:00 AM
Photographer Jamie Paulin

Description

Storage of raw materials and equipment.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 21
Photo Filename DSCN0693.JPG
Date/Time 7/29/2014 11:16:00 AM
Photographer Jamie Paulin

Description

Hazardous waste storage tank. The tank was positioned on a stack of wooden planks. The tank was part of the chemical process used to recover precious metals.

Disk Number 1
Photo Number 22
Photo Filename DSCN0694.JPG
Date/Time 7/29/2014 11:16:00 AM
Photographer Jamie Paulin

Description

Chemical Processing area. Hazardous waste tank storage and process tanks.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 23
Photo Filename DSCN0695.JPG
Date/Time 7/29/2014 11:16:00 AM
Photographer Jamie Paulin

Description

Bottom piping of hazardous waste storage tank. The pipe fixture is used to drain the tank when the material in the tank can no longer be used and is disposed of as a hazardous waste.

Disk Number 1
Photo Number 24
Photo Filename DSCN0696.JPG
Date/Time 7/29/2014 11:19:00 AM
Photographer Jamie Paulin

Description

Hazardous waste storage. The tank is emptied into a tote, which was being stored near the process area.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 25
Photo Filename DSCN0697.JPG
Date/Time 7/29/2014 11:21:00 AM
Photographer Jamie Paulin

Description

Evaporator. The evaporator is used to reduce the liquid waste after it goes through waste water treatment.

Disk Number 1
Photo Number 26
Photo Filename DSCN0698.JPG
Date/Time 7/29/2014 11:22:00 AM
Photographer Jamie Paulin

Description

Evaporator. Hazardous waste storage tanks were located in the back area. The waste is stored in the tanks prior to the evaporator.

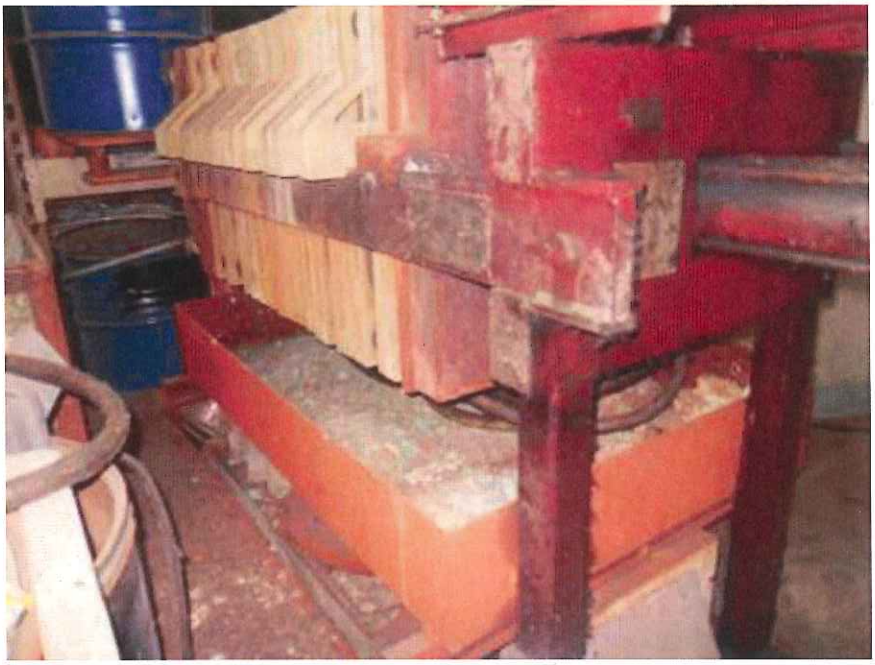
Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 27
Photo Filename DSCN0699.JPG
Date/Time 7/29/2014 11:23:00 AM
Photographer Jamie Paulin

Description

Filter press that is no longer used and has not been used in 10 years. The press was still storing material that had not been cleaned out in 10 years.



Disk Number 1
Photo Number 28
Photo Filename DSCN0700.JPG
Date/Time 7/29/2014 11:23:00 AM
Photographer Jamie Paulin

Description

Liquid that is decanted off of the evaporator once was routed through this filter press. This press has not been used in several years and the filter cake is still being stored inside.

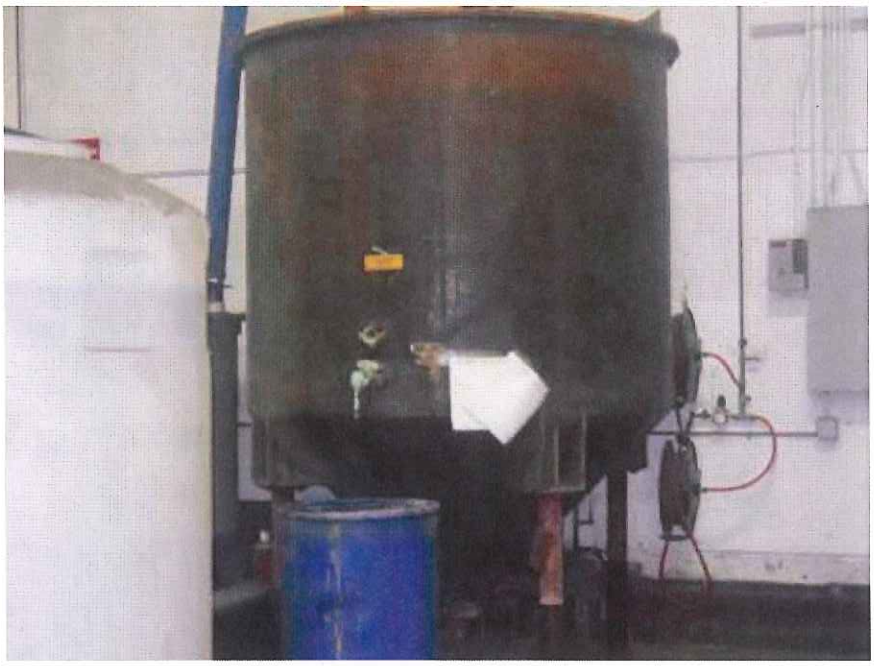
Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 29
Photo Filename DSCN0701.JPG
Date/Time 7/29/2014 11:24:00 AM
Photographer Jamie Paulin

Description

Hazardous waste storage tank. This tank stores the treated material prior to being put through the evaporator.



Disk Number 1
Photo Number 30
Photo Filename DSCN0702.JPG
Date/Time 7/29/2014 11:25:00 AM
Photographer Jamie Paulin

Description

Hazardous waste storage. A tote of hazardous waste, that was received, was being stored prior to precious metal recovery.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 31
Photo Filename DSCN0703.JPG
Date/Time 7/29/2014 11:25:00 AM
Photographer Jamie Paulin

Description

Hazardous waste storage. A tote of hazardous waste, that was received, was being stored prior to precious metal recovery.

Disk Number 1
Photo Number 32
Photo Filename DSCN0704.JPG
Date/Time 7/29/2014 11:27:00 AM
Photographer Jamie Paulin

Description

Evaporator. A thick slurry was located undearneath within the secondary containment.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 33
Photo Filename DSCN0705.JPG
Date/Time 7/29/2014 11:31:00 AM
Photographer Jamie Paulin

Description

Cyanide treatment process prior to evaporator.

Disk Number 1
Photo Number 34
Photo Filename DSCN0706.JPG
Date/Time 7/29/2014 11:33:00 AM
Photographer Jamie Paulin

Description

Received material awaiting processing was being stored on the shelves.

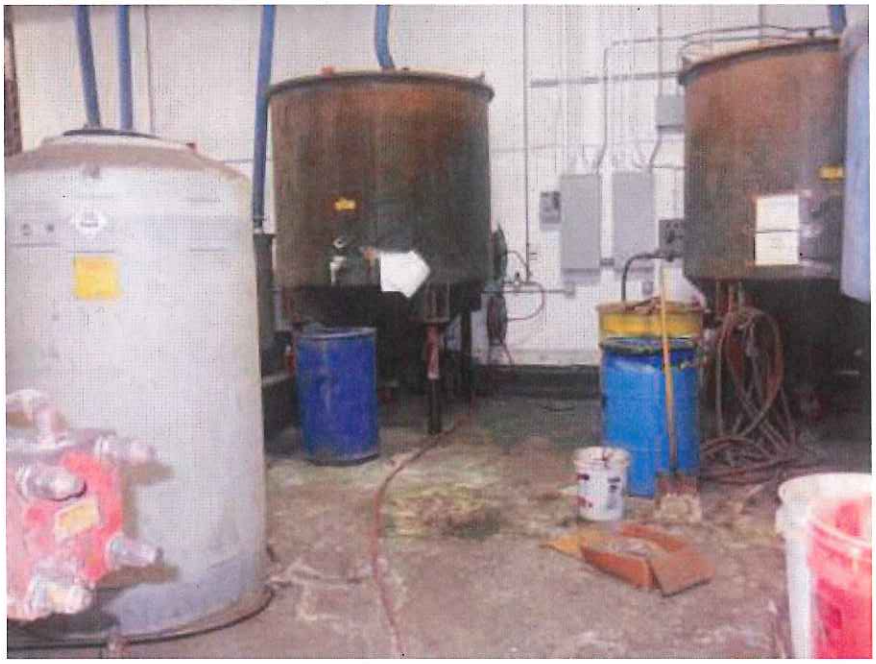
Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 35
Photo Filename DSCN0707.JPG
Date/Time 7/29/2014 11:41:00 AM
Photographer Jamie Paulin

Description

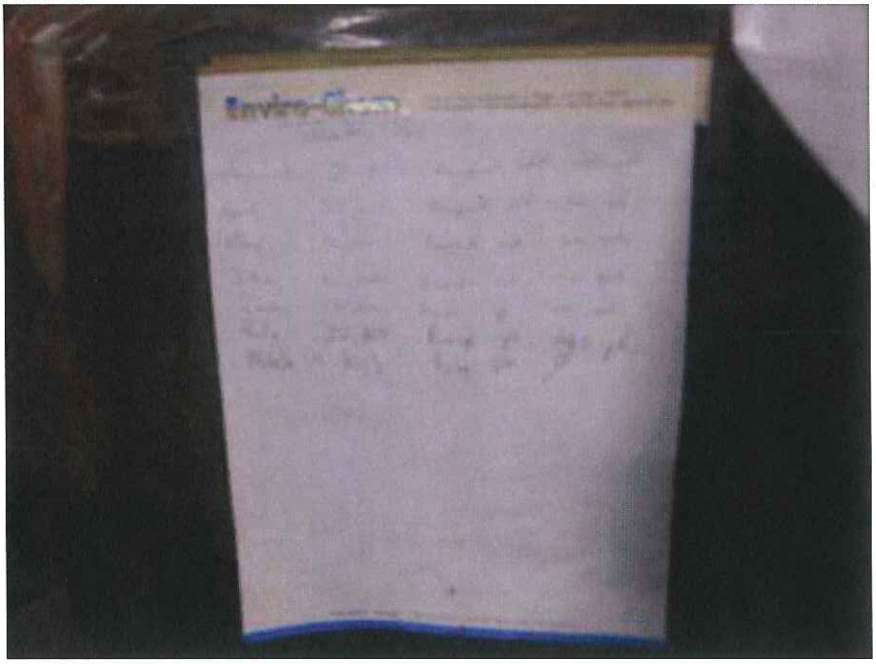
Hazardous waste storage tanks. The tanks store hazardous waste prior to evaporator.



Disk Number 1
Photo Number 36
Photo Filename DSCN0708.JPG
Date/Time 7/29/2014 11:42:00 AM
Photographer Jamie Paulin

Description

The hazardous waste storage tanks had tank level logs taped onto the tanks, tracking the volume of the hazardous waste.



Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 37
Photo Filename DSCN0709.JPG
Date/Time 7/29/2014 2:35:00 PM
Photographer Jamie Paulin

Description

Enviro-Chem's non-ferrous facility, located at 20005 Co Rd 81. Here they store all non-ferrous metal items awaiting precious metal processing at the main facility.

Disk Number 1
Photo Number 38
Photo Filename DSCN0710.JPG
Date/Time 7/29/2014 2:35:00 PM
Photographer Jamie Paulin

Description

A shredder was located at the non-ferrous storage facility. The shredder is used to shred all metal items prior to precious metal processing.

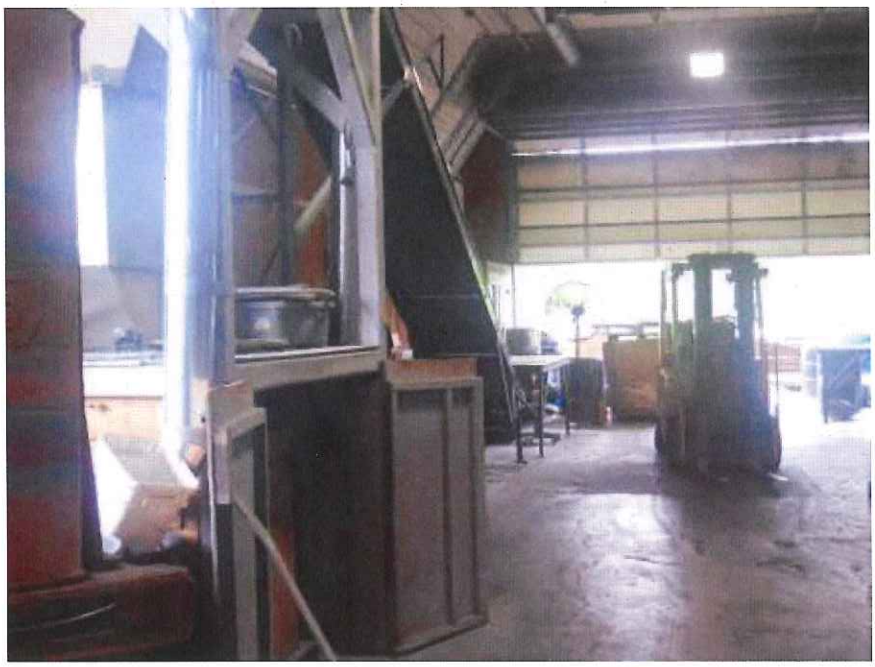
Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 39
Photo Filename DSCN0711.JPG
Date/Time 7/29/2014 2:35:00 PM
Photographer Jamie Paulin

Description

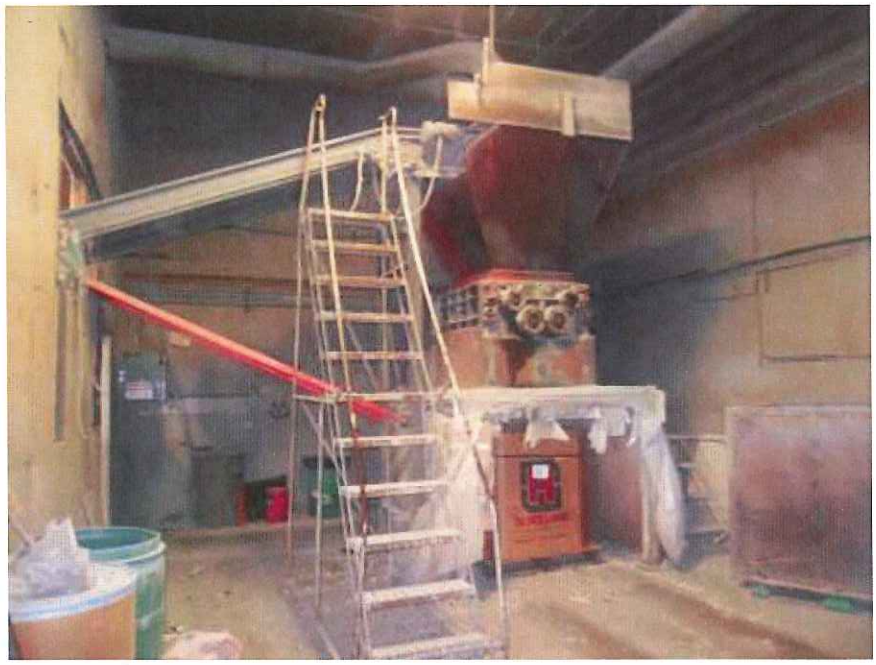
A shredder was located at the non-ferrous storage facility. The shredder is used to shred all metal items prior to precious metal processing.



Disk Number 1
Photo Number 40
Photo Filename DSCN0712.JPG
Date/Time 7/29/2014 2:39:00 PM
Photographer Jamie Paulin

Description

A shredder was located at the non-ferrous storage facility. The shredder is used to shred all metal items prior to precious metal processing.



Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 41
Photo Filename DSCN0713.JPG
Date/Time 7/29/2014 2:45:00 PM
Photographer Jamie Paulin

Description

Storage of metal items, inside the building, that have been received. The items are stored here prior to shredding and shipping to the main facility for precious metal recovery.

Disk Number 1
Photo Number 42
Photo Filename DSCN0714.JPG
Date/Time 7/29/2014 2:45:00 PM
Photographer Jamie Paulin

Description

Storage of metal items, inside the building, that have been received. The items are stored here prior to shredding and shipping to the main facility for precious metal recovery.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 43
Photo Filename DSCN0715.JPG
Date/Time 7/29/2014 2:47:00 PM
Photographer Jamie Paulin

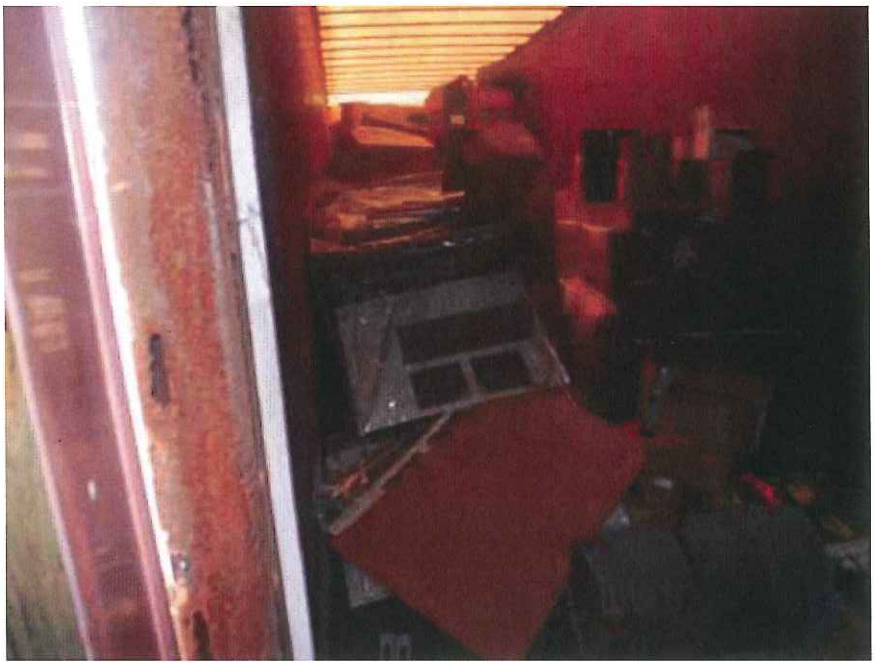
Description

Storage of metal items, inside the building, that have been received. The items are stored here prior to shredding and shipping to the main facility for precious metal recovery.

Disk Number 1
Photo Number 44
Photo Filename DSCN0716.JPG
Date/Time 7/29/2014 2:54:00 PM
Photographer Jamie Paulin

Description

A trailer was located attached to the building. The trailer was also storing metal items that are awaiting to be shredded prior to precious metal recovery.



Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 45
Photo Filename DSCN0717.JPG
Date/Time 7/29/2014 2:57:00 PM
Photographer Jamie Paulin

Description

Storage of metal items, outside the building, that have been received. The items are stored here prior to shredding and shipping to the main facility for precious metal recovery.

Disk Number 1
Photo Number 46
Photo Filename DSCN0718.JPG
Date/Time 7/29/2014 2:57:00 PM
Photographer Jamie Paulin

Description

Storage of metal items, inside the building, that have been received. The items are stored here prior to shredding and shipping to the main facility for precious metal recovery.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number 1
Photo Number 47
Photo Filename DSCN0719.JPG
Date/Time 7/29/2014 2:57:00 PM
Photographer Jamie Paulin

Description

Storage of metal items, inside the building, that have been received. The items are stored here prior to shredding and shipping to the main facility for precious metal recovery.

Disk Number 1
Photo Number 48
Photo Filename DSCN0720.JPG
Date/Time 7/29/2014 2:58:00 PM
Photographer Jamie Paulin

Description

Storage of metal items, inside the building, that have been received. The items are stored here prior to shredding and shipping to the main facility for precious metal recovery.

Photographs for Enviro-Chem CEI 7/29/2014

Media: RCRA

Disk Number	1
Photo Number	49
Photo Filename	DSCN0721.JPG
Date/Time	7/29/2014 2:58:00 PM
Photographer	Jamie Paulin

Description

Storage of metal items, inside the building, that have been received. The items are stored here prior to shredding and shipping to the main facility for precious metal recovery.

Minnesota Pollution Control Agency

Report Title: Large Quantity Generator (LQG) Compliance Evaluation Inspection Checklist

Preferred ID: MND980996805 Regulated Party: Enviro-Chem

Date: 7/29/14 Inspector: Jamie Paulin

G1: Licensing / EPA / Permits			
Rule	**Requirement**	**Compliance Status**	**Remarks**
7045.0221	Has Regulated Party obtained a generator identification number?	✓	
7045.1020 A	Metro Area - Does the Regulated Party have an approved license?	✓	
7045.0225 1	Outstate - Does the site have a current hazardous waste generator license?	✓	
7045.0230 1, B	Outstate - Did the Regulated Party include all hazardous waste streams on its license application?	✓	
7045.0225 2	Is the Regulated Party's license displayed in a public area at the licensed site?	✓	
7001.0520 1, A	Does the Regulated Party operate as a TSD without a permit?	No	
MS 116.48 1	Are aboveground tanks >500 G registered with the MPCA? Are underground tanks registered with the MPCA?	✓	

G1: Waste Evaluation			
Rule	**Requirement**	**Compliance Status**	**Remarks**
7045.0214 1	Have wastes been evaluated within 60 days of the date they were initially generated?	✗	No - material under Evaporator
7045.0294 3	Are test result records of waste analyses kept for 3 years from the last time the waste was sent to a TSDF (on- or off-site)?	✓	

G1: General Management for Generators			
Rule	**Requirement**	**Compliance Status**	**Remarks**
7045.0208 1	Is hazardous waste properly disposed of?	2.	
7045.0208 1, E	Does the Regulated Party comply with the POTW requirements for sewered hazardous waste?	✓	
7045.0294 5	Are the required records (training, analytical results, inspection reports, license renewal app, exception reports, manifests) located at the licensed site and available for inspection?	✓	
7045.0568 1	Have emergency response arrangements been made with local authorities and outside providers? (fire, police, local hospital, emergency responders)	✓	
7045.0568 3	Has the Regulated Party documented in its operating record the arrangements made with local emergency authorities?	✓	
7045.0655 3, A	If there is an elementary neutralization unit, a pretreatment unit and/or waste water treatment unit, does the owner or operator conduct timely inspections of the unit(s) for malfunction, deterioration, operator error and discharges?	2.	No Jar test assessment on-site
7045.0655 3, B	If there is an elementary neutralization unit, a pretreatment unit and/or waste water treatment unit, does the Regulated Party follow a written inspection schedule for inspection of all monitoring equipment, safety and emergency equipment, security devices and operating and structural equipment?	✓	
7045.0655 3, E	If there is an elementary neutralization unit, a pretreatment unit and/or waste water treatment unit, are all applicable inspection (and repair) records (logs) kept for at least 3 years and available on-site?	✓	
7045.0845	Does the Regulated Party properly manage used oil?	✓	
7045.0895 4	Has used oil accepted from or given to another business to be burned for energy recovery been tested to determine that it is on-specification?	✓	

G1: General Management for Generators

Rule	Requirement	Compliance Status	Remarks
7045.0855 4, C	Does the Regulated Party keep records of every shipment of used oil leaving the generator site for at least three years?	2.	
7045.0805	Does the Regulated Party properly manage used oil-contaminated waste?	✓	
7045.0855 4, C	Does the Regulated Party keep records of every shipment of used oil-contaminated waste leaving the generator site for at least three years?	2.	
7045.0990	Is the Regulated Party properly managing used oil filters?	✓	
7045.0990 3, C, 3	Does the Regulated Party keep records of all used oil filters taken off-site by used oil-filter transporters for at least three years?	2.	

G1: Preparedness & Prevention

Rule	Requirement	Compliance Status	Remarks
7045.0566 2	Is hazardous waste managed to prevent or minimize releases?	No	making Haz Waste in their pans
7045.0566 3, A	Is a suitable alarm or communication system in place to provide emergency instructions to Regulated Party personnel?	✓	
7045.0566 3, B	Is emergency communication equipment available to summon outside emergency responders?	✓	
7045.0566 3, C	Is fire control equipment, decontamination equipment, and spill control equipment available?	✓	

G1: Preparedness & Prevention			
Rule	**Requirement**	**Compliance Status**	**Remarks**
7045.0566 3, D	Is water available in adequate volume for fire control (i.e., firehose, sprinkler system and/or foam equipment) ?	2.	
7045.0566 4	Is emergency equipment tested and maintained?	✓	
7045.0566 5	Does the Regulated Party provide all personnel involved in hazardous waste being poured, mixed, spread, or otherwise handled with immediate access to an internal alarm or emergency communication device?	✓	
7045.0566 6	Is aisle space adequate for emergency operations (like fire fighting, spill cleanup, etc)?	✓	
7060.0600 2	Has the Regulated Party discharged waste or pollutants to the unsaturated zone, through spills, dumping, sewering or other means?	NA	
7045.0275 2	If the Regulated Party had a release to the environment did the Regulated Party immediately notify the agency?	NA	
7045.0275 3	If the Regulated Party has had a release, did the Regulated Party recover as rapidly and as thoroughly as possible, any HW that has leaked, spilled, or otherwise escaped a container?	NA	
7045.0855 2, D	Upon detection of a release of used oil to the environment (not orginating from a UST) did the Regulated Party stop the release, contain the released used oil, clean up and manage properly the released used oil and other materials contaminated with used oil, and repair or replace any leaking used oil storage equipment prior to returning it to service to prevent future releases?	N/A	

G1: Storage Requirements			
Rule	**Requirement**	**Compliance Status**	**Remarks**
7045.0292 1, F	Are hazardous waste containers & tanks properly labeled with the words "Hazardous Waste" and a description that clearly identifies their contents to employees and emergency personnel?	✓	
7045.0292 1, C	Are hazardous waste containers and tanks labeled with the waste accumulation start date and is it visible for inspection? OR Is the accumulation start date recorded in a clear and legible log for non-shipping containers or tanks?	✓	
7045.0292 1, A	Has the generator stored HW for more than 90 days beyond the waste accumulation start date?	yes	- in date pans
7045.0292 1, D	Are hazardous waste storage areas (outdoors) protected from unauthorized access and inadvertent damage from vehicles & equipment?	✓	
7045.0292 1, E	Are hazardous waste containers that hold free liquid placed on an impermeable containment surface? If outdoors, is the surface curbed?	2.	
7045.0626 2, A	Are hazardous waste storage containers in good condition and leakproof?	✓	
7045.0626 2, B	Are there suitable leakproof covers for the hazardous waste containers?	✓	
7045.0626 3	Are hazardous waste storage containers compatible with the waste stored in them?	✓	
7045.0626 4	Are hazardous waste storage containers closed? Are waste containers which can be degraded when exposed to moisture or sunlight covered by an overhead roof or other suitable covering that does not hide the labels?	✓	
7045.0626 5	Are weekly inspections of hazardous waste containers and their storage areas conducted AND documented?	✓	

G1: Storage Requirements

Rule	Requirement	Compliance Status	Remarks
7045.0626 6	Are incompatible wastes adequately separated?	✓	
7045.0292 8, B,2	Are satellite accumulation containers properly labeled with "Hazardous Waste" and a clear description of their contents?	✓	
7045.0292 8, C,2	For satellite accumulation containers, if located away from the point of generation, are they inspected weekly, and are written records kept?	✓	
7045.0292 8, D,1	For satellite accumulation containers, is fill date marked on the containers?	✓	
7045.0292 8, D,2	For satellite accumulation containers, are they moved within 3 days of fill date to storage area?	X	No - Greater than 55 gal in total
7045.0855 2, C	If used oil is stored, is it stored in containers or tanks that are in good condition, stored on impermeable surfaces, kept closed, and labeled "Used Oil" (including tanks, containers and piping)?	✓	
7045.0855 2, C	Are wastes contaminated with used oil stored in containers or tanks that are in good condition, on impermeable surfaces, closed, and labeled "Used Oil" or "Used Oily Waste"?	✓	
7045.0990 3, A	If used oil filters are stored, are they stored in containers that are closed, leakproof and labeled "Used Oil Filters"?	✓	
273.14 (a)	Are universal waste batteries (each battery), or a battery storage container, labeled with: "Universal Waste-Battery(ies)," or "Waste Battery(ies)," or "Used Battery(ies)"?	✓	
273.13 (a)	Are universal waste batteries (lead acid, NiCad, etc) that show evidence of leakage, spillage, or damage stored in a closed, structurally sound, compatible container?	✓	

G1: Storage Requirements

Rule	Requirement	Compliance Status	Remarks
273.14 (e)	Are containers of universal waste lamps labeled with: "Universal Waste-Lamp(s)" or "Waste Lamp(s)" or "Used Lamp(s)"?	✓	
273.13 (d)	Are universal waste lamps stored in closed containers that are structurally sound, adequate to prevent breakage, and compatible? Do containers lack evidence of leakage, spillage, or damage?	✓	
273.13 (c)	Is mercury containing equipment stored in closed containers that are structurally sound, compatible with the contents of the device? Does the container lack evidence of leakage, spillage, or damage?	✓	
273.14 (d)	Is mercury containing equipment (i.e. each device) or a container in which the equipment in contained labeld with: "Universal Waste - Mercury Containing Equipment," "Waste Mercury-Containing Equipment," or "Used Mercury -Containing Equipment"?	✓	

G1: Manifests

Rule	Requirement	Compliance Status	Remarks
7045.0261 1	Are shipments of hazardous waste made without using a manifest? (exceptions for VSQGs)	✓	
7045.0261 7	Do manifests contain ALL of the following?: Manifest document number, generator data, transporter data, facility data, waste data, required signatures & dates, and a 24 hour emergency number. (document problem manifests in remarks and Description of Violation)	✓	
7045.0265 1, D	Have copies of manifests signed by the generator and transporter been sent to the MPCA within five working days of the initial transporter's acceptance of the waste?	✓	
7045.0265 4, A	Have copies of manifests signed by the facility been sent to the MPCA within 40 days of the acceptance of the waste by the facility?	✓	

G1: Manifests

Rule	Requirement	Compliance Status	Remarks
7045.0298	If applicable, has the generator submitted to the MPCA an exception report for manifest copies not received back from the TSDF within 45 days of the date the waste was initially shipped?	✓	
7045.0294 1	Are signed facility copies of manifests available for review for 3 years from the date material was accepted by the initial transporter?	✓	
7045.0302 1	If Regulated Party exports hazardous waste, are all applicable rules being complied with? (notification, consent, EPA acknowledgement of consent, shipping papers or manifests, etc)	N.	

G1: Land Disposal Restrictions

Rule	Requirement	Compliance Status	Remarks
268.7 (a), (2)	For waste or contaminated soil that does not meet treatment standards, has the Regulated Party sent a one-time land disposal restriction notification to the receiving treatment or storage facility? Is a copy of the notification available at the Regulated Party's site? Have new notifications been sent when there are changes in waste streams and to any new receiving facilities?	✓	

G1: Personnel Training

Rule	Requirement	Compliance Status	Remarks
7045.0558 1	Have employees that manage hazardous waste completed a hazardous waste training program?	✓	
7045.0558 2	Does the Regulated Party have a hazardous waste program director trained in hazardous waste management procedures?	✓	
7045.0558 3	Does the training program include hazardous waste management and emergency response procedures relevant to the positions held by facility personnel?	✓	

G1: Personnel Training

Rule	Requirement	Compliance Status	Remarks
7045.0558 4	Are new employees trained in hazardous waste management within 6 months of hire or transfer?	✓	
7045.0558 5	Is refresher training regarding the management of hazardous waste provided at least once per calendar year?	✓	
7045.0558 6, A	Does the Regulated Party maintain training records which include a job title for each position at the facility related to hazardous waste?	✓	
7045.0558 6, B	Do the records include a job description for each position related to hazardous waste?	✓	
7045.0558 6, C	Is a written description of the type and amount of training (initial & continuing) documented for each position related to hazardous waste?	✓	
7045.0558 6, D	Has the Regulated Party kept records that document that the initial training and annual review training has been given?	✓	
7045.0558 7	Have training records been maintained for lifetime of facility (or 3 years after an employee leaves.)?	✓	

G1: Contingency Plan

Rule	Requirement	Compliance Status	Remarks
7045.0572 2	Does the Regulated Party have a contingency plan?	✓	
7045.0574 1	Does the Regulated Party have an Emergency Coordinator on-site or on-call, and does s/he have authority to act (commit resources?)	✓	

G1: Contingency Plan			
Rule	**Requirement**	**Compliance Status**	**Remarks**
7045.0572 4, A	Does the contingency plan specify employees' emergency response actions?	✓	
7045.0572 4, C	Does the plan describe arrangements agreed to with local emergency responders?	✓	
7045.0572 4, D	Does the plan include up-to-date name, address and Home and Work phone numbers for emergency coordinators?	✓	
7045.0572 4, E	Does the contingency plan include an up-to-date emergency equipment list?	✓	
7045.0572 4, F	Is there an evacuation plan for employees that includes signals used to begin evacuation, and primary and alternate evacuation routes?	✓	
7045.0572 5, A	Is a copy of the contingency plan maintained on-site?	✓	
7045.0572 5, B	Have copies of the contingency plan been submitted to local authorities and emergency response teams?	✓	
7045.0572 6	Has the contingency plan been amended when necessary? (rule change, emerg.eqpt change, process change, emerg. coord. change, plan failed)	✓	

US EPA Region 5 Document Log

EPA Inspector:
Jamie L. Paulin

Production Area	Description	Area Requested From	Date Received	EPA Document Number	CBI Claimed	Pages Obtained
General	Enviro-Chem Evacuation Map	Records	7/29/2014	JP-ec-14-01	No	1
General	Tank Area Daily Inspection Logs	Records	7/29/2014	JP-ec-14-02	No	3
General	Contingency Plan and Emergency Procedure	Records	7/29/2014	JP-ec-14-03	No	17
Hennepin County	Pinnacle Engineering Tank Inspection	Hennepin County	7/29/2014	JP-ec-14-04	No	4